

AMENDMENTS TO THE CLAIMS

1 to 15 (Cancelled)

16. (Currently Amended) A thermoplastic layered alkyl siloxane with the composition represented by the formula $(\text{RSi}_{1+x}\text{O}_{1.5+2x+0.5z}\text{L}_z)_m$ ~~$(\text{RSi}_{1+x}\text{O}_{2+1.5x+0.5z}\text{L}_z)_m$~~ ~~[[()]]~~ here wherein, R is an alkyl group of 8 or more carbon atoms, L is H or a group capable of easily changing the OL group into the OH group in a solution or a suspension, x is a ratio of Si atoms bonded with four oxygen atoms with respect to total Si atoms, and $0.5 \leq x \leq 2$, $2 \leq m \leq 200$, $0 \leq z \leq 1$, and wherein the melting point is in a temperature range of -30 to 60°C.

17. (Previously Presented) The thermoplastic layered alkyl siloxane according to claim 16, wherein the decomposing temperature is 300°C or more.

18. (Previously Presented) A production method for a thermoplastic layered alkyl siloxane according to claim 16 wherein an alkyl silane compound represented by the formula $\text{RSi}(\text{OL})_3$, where R is an alkyl group, L is H, Si or a group capable of changing the OL group into the OH group in a solution or a suspension and a silicon compound represented by the formula $\text{Si}(\text{OM})_4$, where M is H or a group capable of changing the OM group into the OH group in a solution or a suspension, are reacted in the presence of water in a solvent or a dispersion medium using an alkaline compound or an acidic compound as a catalyst,

and wherein a concentration of the alkyl silane compound and the silicon compound in the reaction liquid is 10 to 80 wt% and the reaction is carried out at 50 to 200°C.

19. (Previously Presented) The production method for a thermoplastic layered alkyl siloxane according to claim 18 wherein an ammonium is used as a catalyst.

20. (Previously Presented) A coating agent, containing the thermoplastic layered alkyl siloxane according to claim 16 as the effective component.

21. (Previously Presented) A filler, containing the thermoplastic layered alkyl siloxane according to claim 16 for at least a part thereof.

22. (Previously Presented) An energy storing material, containing the thermoplastic layered alkyl siloxane according to claim 16 for at least a part thereof.

23. (Previously Presented) A temperature sensor, containing the thermoplastic layered alkyl siloxane according to claim 16 for at least a part thereof.